



(1) GENERAL INFORMATION:

- (i) APPLICANT: BLACK, Roy A.
PAXTON, Raymond J.
BODE, Wolfram
NASKOS, Klaus
FERNANDEZ-CATALAN, Carlos
- (ii) TITLE OF INVENTION: CRYSTALLINE TNF-alpha-CONVERTING ENZYME
AND USES THEREOF
- (iii) NUMBER OF SEQUENCES: 6
- (iv) CORRESPONDENCE ADDRESS:
 - (A) ADDRESSEE: Foley & Lardner
 - (B) STREET: Suite 500, 3000 K Street NW
 - (C) CITY: Washington
 - (D) STATE: DC
 - (E) COUNTRY: USA
 - (F) ZIP: 200078696
- (v) COMPUTER READABLE FORM:
 - (A) MEDIUM TYPE: Floppy disk
 - (B) COMPUTER: IBM PC compatible
 - (C) OPERATING SYSTEM: PC-DOS/MS-DOS
 - (D) SOFTWARE: PatentIn Release #1.0, Version #1.30
- (vi) CURRENT APPLICATION DATA:
 - (A) APPLICATION NUMBER: US 09/050,083
 - (B) FILING DATE: 30-MAR-1998
 - (C) CLASSIFICATION:
- (vii) PRIOR APPLICATION DATA:
 - (A) APPLICATION NUMBER: US 60/073,709
 - (B) FILING DATE: 05-FEB-1998
- (viii) ATTORNEY/AGENT INFORMATION:
 - (A) NAME: Isacson, John P.
 - (B) REGISTRATION NUMBER: 33,715
 - (C) REFERENCE/DOCKET NUMBER: 016761/0144
- (ix) TELECOMMUNICATION INFORMATION:
 - (A) TELEPHONE: 202-672-5300
 - (B) TELEFAX: 202-672-5399

(2) INFORMATION FOR SEQ ID NO:1:

- (i) SEQUENCE CHARACTERISTICS:
 - (A) LENGTH: 10 amino acids
 - (B) TYPE: amino acid
 - (C) STRANDEDNESS:
 - (D) TOPOLOGY: linear
- (ii) MOLECULE TYPE: peptide
- (xi) SEQUENCE DESCRIPTION: SEQ ID NO:1:

| | | | | | | | | | |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| Pro | Leu | Ala | Gln | Ala | Val | Arg | Ser | Ser | Ser |
| 1 | | | | 5 | | | | | 10 |

(2) INFORMATION FOR SEQ ID NO:2:

- (i) SEQUENCE CHARACTERISTICS:
 (A) LENGTH: 8 amino acids
 (B) TYPE: amino acid
 (C) STRANDEDNESS:
 (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: peptide

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:2:

Gly Ser His His His His His His
 1 5

(2) INFORMATION FOR SEQ ID NO:3:

- (i) SEQUENCE CHARACTERISTICS:
 (A) LENGTH: 11 amino acids
 (B) TYPE: amino acid
 (C) STRANDEDNESS:
 (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: peptide

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:3:

His Glu Xaa Xaa His Xaa Xaa Gly Xaa Xaa His
 1 5 10

(2) INFORMATION FOR SEQ ID NO:4:

- (i) SEQUENCE CHARACTERISTICS:
 (A) LENGTH: 203 amino acids
 (B) TYPE: amino acid
 (C) STRANDEDNESS:
 (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: peptide

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:4:

Glu Gln Asn Leu Pro Gln Arg Tyr Ile Glu Leu Val Val Val Ala Asp
 1 5 10 15
 Arg Arg Val Phe Met Lys Tyr Asn Ser Asp Leu Asn Ile Ile Arg Thr
 20 25 30
 Arg Val His Glu Ile Val Asn Ile Ile Asn Glu Phe Tyr Arg Ser Leu
 35 40 45
 Asn Ile Arg Val Ser Leu Thr Asp Leu Glu Ile Trp Ser Gly Gln Asp
 50 55 60
 Phe Ile Thr Ile Gln Ser Ser Ser Ser Asn Thr Leu Asn Ser Phe Gly
 65 70 75 80

(i) SEQUENCE CHARACTERISTICS:
(A) LENGTH: 287 amino acids
(B) TYPE: amino acid
(C) STRANDEDNESS:
(D) TOPOLOGY: linear

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:5:

| | | | | | | | | | | | | | | | |
|-----------|-----------|------------|------------|-----------|-----------|-----------|------------|------------|-----------|-----------|-----------|------------|------------|-----------|-----------|
| Pro 1 | Glu | Glu | Leu | Val 5 | His | Arg | Val | Lys | Arg 10 | Arg | Ala | Asp | Pro | Asp 15 | Pro |
| Met | Lys | Asn | Thr 20 | Cys | Lys | Leu | Leu | Val 25 | Val | Ala | Asp | His | Arg 30 | Phe | Tyr |
| Arg | Tyr | Met 35 | Gly | Arg | Gly | Glu | Glu 40 | Ser | Thr | Thr | Thr | Asn 45 | Tyr | Leu | Ile |
| Glu | Leu 50 | Ile | Asp | Arg | Val | Asp 55 | Asp | Ile | Tyr | Arg | Asn 60 | Thr | Ser | Trp | Asp |
| Asn 65 | Ala | Gly | Phe | Lys | Gly 70 | Tyr | Gly | Ile | Gln | Ile 75 | Glu | Gln | Ile | Arg | Ile 80 |
| Leu | Lys | Ser | Pro | Gln 85 | Glu | Val | Lys | Pro | Gly 90 | Glu | Lys | His | Tyr | Asn 95 | Met |
| Ala | Lys | Ser | Tyr 100 | Pro | Asn | Glu | Glu | Lys 105 | Asp | Ala | Trp | Asp | Val 110 | Lys | Met |
| Leu | Leu | Glu 115 | Gln | Phe | Ser | Phe | Asp 120 | Ile | Ala | Glu | Glu | Ala 125 | Ser | Lys | Val |

Cys Leu Ala His Leu Phe Thr Tyr Gln Asp Phe Asp Met Gly Thr Leu
 130 135 140
 Gly Leu Ala Tyr Val Gly Ser Pro Arg Ala Asn Ser His Gly Gly Val
 145 150 155 160
 Cys Pro Lys Ser Gly Ser Ser Gly Gly Ile Cys Glu Lys Ala Tyr Tyr
 165 170 175
 Ser Pro Val Gly Lys Lys Asn Ser Lys Leu Tyr Ser Asp Gly Lys Lys
 180 185 190
 Lys Glu Ala Asp Leu Val Thr Thr His Glu Leu Gly His Asn Phe Gly
 195 200 205
 Ala Glu His Asp Pro Asp Gly Leu Ala Glu Cys Ala Pro Asn Glu Asp
 210 215 220
 Gln Gly Gly Lys Tyr Val Met Tyr Pro Ile Ala Val Ser Gly Asp His
 225 230 235 240
 Glu Asn Asn Lys Met Phe Ser Asn Cys Ser Lys Gln Ser Ile Tyr Lys
 245 250 255
 Thr Ile Glu Ser Lys Ala Gln Glu Cys Phe Gln Glu Arg Ser Asn Lys
 260 265 270
 Val Cys Gly Asn Ser Arg Val Asp Glu Gly Glu Glu Cys Asp Pro
 275 280 285

(2) INFORMATION FOR SEQ ID NO:6:

(i) SEQUENCE CHARACTERISTICS:

- (A) LENGTH: 276 amino acids
- (B) TYPE: amino acid
- (C) STRANDEDNESS:
- (D) TOPOLOGY: linear

(ii) MOLECULE TYPE: peptide

(xi) SEQUENCE DESCRIPTION: SEQ ID NO:6:

Gln Glu Lys His Ala Ile Asn Gly Pro Glu Leu Leu Arg Lys Arg Arg
 1 5 10 15
 Thr Thr Ser Ala Glu Lys Asn Thr Cys Gln Leu Tyr Ile Gln Thr Asp
 20 25 30
 His Leu Phe Phe Lys Tyr Tyr Gly Thr Arg Glu Ala Val Ile Ala Gln
 35 40 45
 Ile Ser Ser His Val Lys Ala Ile Asp Thr Ile Tyr Gln Thr Thr Asp
 50 55 60
 Phe Ser Gly Ile Arg Asn Ile Ser Phe Met Val Lys Arg Ile Arg Ile
 65 70 75 80
 Asn Thr Thr Ala Asp Glu Lys Asp Pro Thr Asn Pro Phe Arg Phe Pro
 85 90 95

Asn Ile Ser Val Glu Lys Phe Leu Glu Leu Asn Ser Glu Gln Asn His
 100 105 110
 Asp Asp Tyr Cys Leu Ala Tyr Val Phe Thr Asp Arg Asp Phe Asp Asp
 115 120 125
 Gly Val Leu Gly Leu Ala Trp Val Gly Ala Pro Ile Tyr Leu Asn Ser
 130 135 140
 Gly Leu Thr Ser Thr Ser Leu Asn Thr Gly Ile Ile Thr Val Lys Asn
 145 150 155 160
 Tyr Gly Lys Thr Ile Leu Thr Lys Gln Asn Tyr Gly Ser His Val Pro
 165 170 175
 Pro Lys Val Ser His Ile Thr Phe Ala His Glu Val Gly His Asn Phe
 180 185 190
 Gly Ser Pro His Asp Ser Gly Thr Glu Cys Thr Pro Gly Glu Ser Lys
 195 200 205
 Asn Leu Gly Gln Lys Glu Asn Gly Asn Tyr Ile Met Tyr Ala Arg Ala
 210 215 220
 Thr Ser Gly Asp Lys Leu Asn Asn Asn Lys Phe Ser Leu Cys Ser Ile
 225 230 235 240
 Arg Asn Ile Ser Gln Val Leu Glu Lys Lys Arg Asn Asn Cys Phe Val
 245 250 255
 Glu Ser Gly Gln Pro Ile Cys Gly Asn Gly Met Val Glu Gln Gly Glu
 260 265 270
 Glu Cys Asp Cys
 275